Tumor Associated Glycoprotein [B72.3]

Concentrated and Prediluted Monoclonal Antibody Control Number: 902-002-111418

Catalog Number:	ACR 002 B, C	APR 002 AA
Description:	0.5, 1.0 mL conc.	6.0 mL, RTU
Dilution:	1:100	Ready-to-use
Diluent:	Da Vinci Green	N/A

Intended Use:

For Research Use Only. Not for use in diagnostic procedures.

Summary and Explanation:

B72.3 recognizes an oncofetal antigen of >1,000 kDa, identified as a tumor-associated glycoprotein (TAG-72) with properties of a mucin. The majority of human adenocarcinomas including colorectal, pancreatic, gastric, ovarian, endometrial, mammary and non-small cell lung cancer display some cell populations that are positive for B72.3 staining. Weak or no reactivity has been observed with most cell types of normal adult tissue excepting the secretory endometrium. About 60% of carcinoma patients express TAG-72 in their sera. It is reportedly useful in distinguishing pulmonary adenocarcinomas that are B72.3 (+) from pleural mesotheliomas that are B72.3 (-).

Principle of Procedure:

Antigen detection in tissues and cells is a multi-step immunohistochemical process. The initial step binds the primary antibody to its specific epitope. After labeling the antigen with a primary antibody, a secondary antibody is added to bind to the primary antibody. An enzyme label is then added to bind to the secondary antibody; this detection of the bound antibody is evidenced by a colorimetric reaction. **Source:** Mouse monoclonal

Species Reactivity: Human

Clone: B72.3

Isotype: IgG1/kappa

Protein Concentration: Call for lot specific Ig concentration. **Epitope/Antigen:** TAG-72 or B72.3

Cellular Localization: Cell surface and cytoplasmic

Positive Tissue Control: Colon carcinoma or breast cancer Known Applications:

Immunohistochemistry (formalin-fixed paraffin-embedded tissues) **Supplied As:** Buffer with protein carrier and preservative

Storage and Stability:

Store at 2°C to 8°C. The product is stable to the expiration date printed on the label, when stored under these conditions. Do not use after expiration date. Diluted reagents should be used promptly; any remaining reagent should be stored at 2°C to 8°C.

Staining Protocol Recommendations (intelliPATH FLX[®] and manual use):

Peroxide Block: Block for 5 minutes with Peroxidazed 1.

Digestion Method: Digest with Trypsin enzyme for 5 minutes at 37°C -OR- for 15 minutes at RT.

Protein Block (Optional): Incubate for 5-10 minutes at RT with Background Punisher.

Primary Antibody: Incubate for 30 minutes at RT.

Probe: Incubate for 10 minutes at RT with a secondary probe.

Polymer: Incubate for 10-20 minutes at RT with a tertiary polymer.

Chromogen: Incubate for 5 minutes at RT with Biocare's DAB - OR - Incubate for 5-7 minutes at RT with Warp Red.

Counterstain:

Counterstain with hematoxylin. Rinse with deionized water. Apply Tacha's Bluing Solution for 1 minute. Rinse with deionized water. **Technical Note:**

This antibody, for intelliPATH FLX and manual use, has been standardized with MACH 4 detection system. Use TBS for washing steps.

Limitations:

This product is provided for Research Use Only (RUO) and is not for use in diagnostic procedures. Suitability for specific applications may vary and it is the responsibility of the end user to determine the appropriate application for its use.

Precautions:

1. This antibody contains less than 0.1% sodium azide. Concentrations less than 0.1% are not reportable hazardous materials according to U.S. 29 CFR 1910.1200, OSHA Hazard communication and EC Directive 91/155/EC. Sodium azide (NaN₃) used as a preservative is toxic if ingested. Sodium azide may react with lead and copper plumbing to form highly explosive metal azides. Upon disposal, flush with large volumes of water to prevent azide build-up in plumbing. (Center for Disease Control, 1976, National Institute of Occupational Safety and Health, 1976) (3)

2. Specimens, before and after fixation, and all materials exposed to them should be handled as if capable of transmitting infection and disposed of with proper precautions. Never pipette reagents by mouth and avoid contacting the skin and mucous membranes with reagents and specimens. If reagents or specimens come in contact with sensitive areas, wash with copious amounts of water. (4)

3. Microbial contamination of reagents may result in an increase in nonspecific staining.

4. Incubation times or temperatures other than those specified may give erroneous results. The user must validate any such change.

5. Do not use reagent after the expiration date printed on the vial.

6. The SDS is available upon request and is located at http://biocare.net. **Technical Support:**

Contact Biocare's Technical Support at 1-800-542-2002 for questions regarding this product.

References:

1. van Niekerk CC, *et al.* Differentiation margins of ovarian tumor pathology: first incidences of epithelial ovarian tumors monitored by marker antibodies. Cancer Detect Prev. 1997; 21(3):247-57.

2. Guadagni F, *et al.* TAG-72 expression and its role in the biological evaluation of human colorectal cancer. Anticancer Res. 1996 Jul-Aug; 16(4B):2141-8.

3. Center for Disease Control Manual. Guide: Safety Management, NO. CDC-22, Atlanta, GA. April 30, 1976 "Decontamination of Laboratory Sink Drains to Remove Azide Salts."

4. Clinical and Laboratory Standards Institute (CLSI). Protection of Laboratory Workers from Occupationally Acquired Infections; Approved Guideline-Fourth Edition CLSI document M29-A4 Wayne, PA 2014.

